Pastel

Network Measurement Note #8
Network Working Group
Request for Comments #388
NIC #11360
Updates RFC #323

Both!

V. Cerf
UCLA-NMC
23 August 72

Rcvd 11. Sept. 72

NCP Statistics

After a lapse of 5 months since RFC #323 was issued (23 March), I am pleased to announce that UCLA-NMC is prepared to gather your NCP statistics automagically on a daily basis. The results will be published monthly as Network Measurement notes and as RFC's. We will periodically open a connection on your local socket #241 (decimal), expecting you to send the following data in the format shown:

<duplicate pages 3-5 of RFC 323 here>

a. Total bits sent to HOST
b. Total bits received from HOST
c. Total messages sent to HOST
d. Total messages received from HOST and optionally
e. Average Round Trip delay on send connections to HOST

The information above should be collected only for standard open connections (i.e. those using standard NCP protocol) and not measurement links or experimental NCP links, and in particular, not traffic on link 0).

Another optional measurement would be to gather the distribution of message types over link 0 over all HOSTS (i.e. not broken down by HOST). This will reveal the relative utilization of control messages (ALLOC should be very prevalent).

The data collected for the last 24 hour sample period should be available from a process listening on local socket number 241_{10}.

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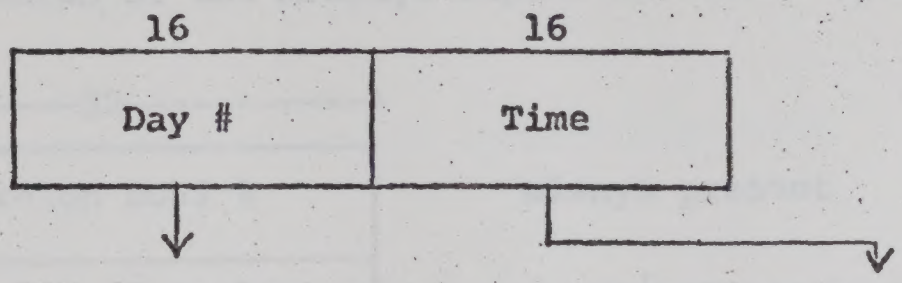
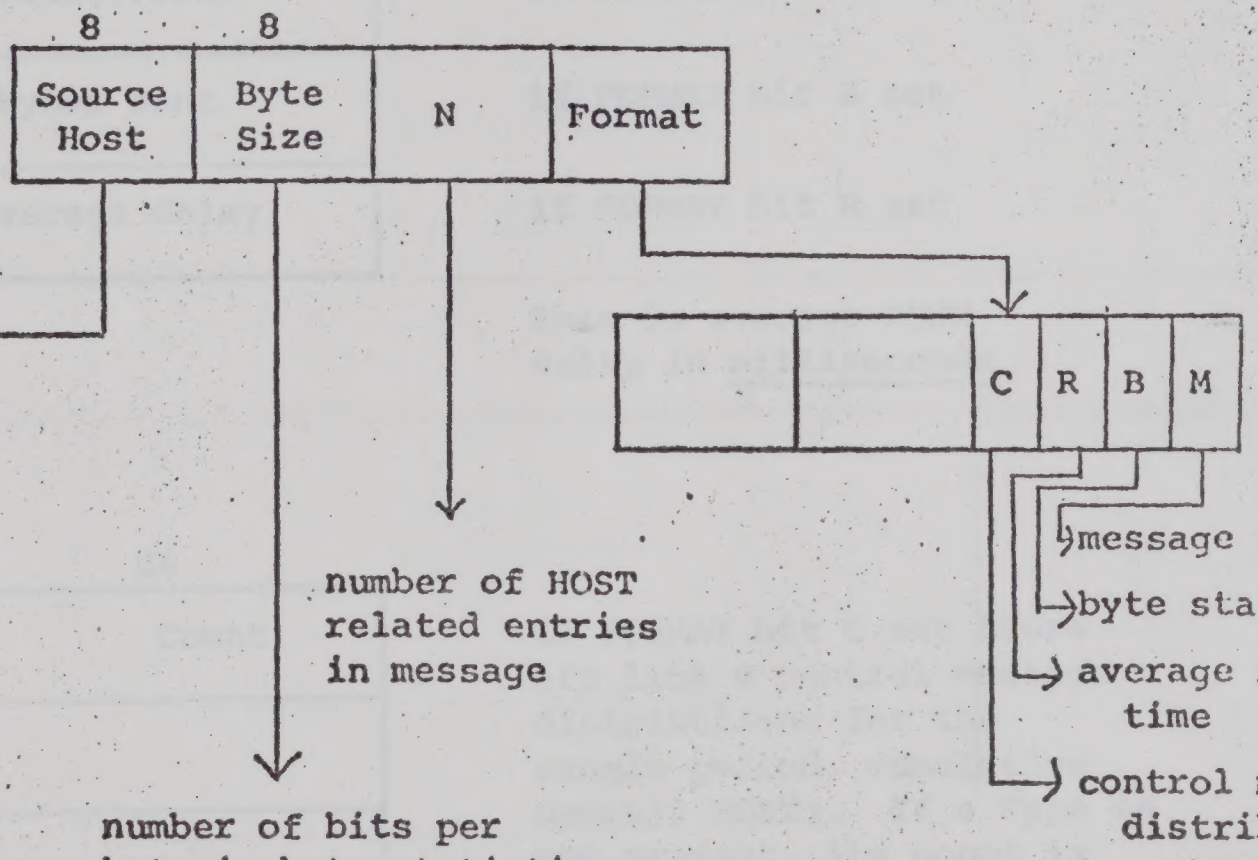
word 0



1 - 365 (6 on leap year)

Time in minutes at which sample was started. Ranges from 0 (midnight) to 1439.

word 1



Network Host number

number of HOST related entries in message

number of bits per byte in byte statistics

message statistics

byte statistics

average round-trip time

control message distribution

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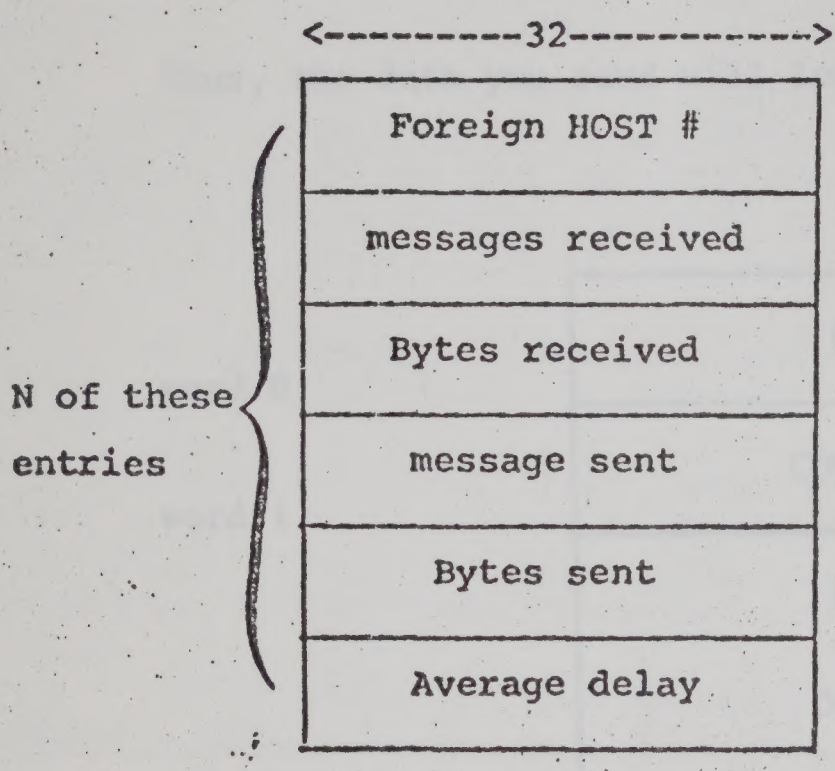
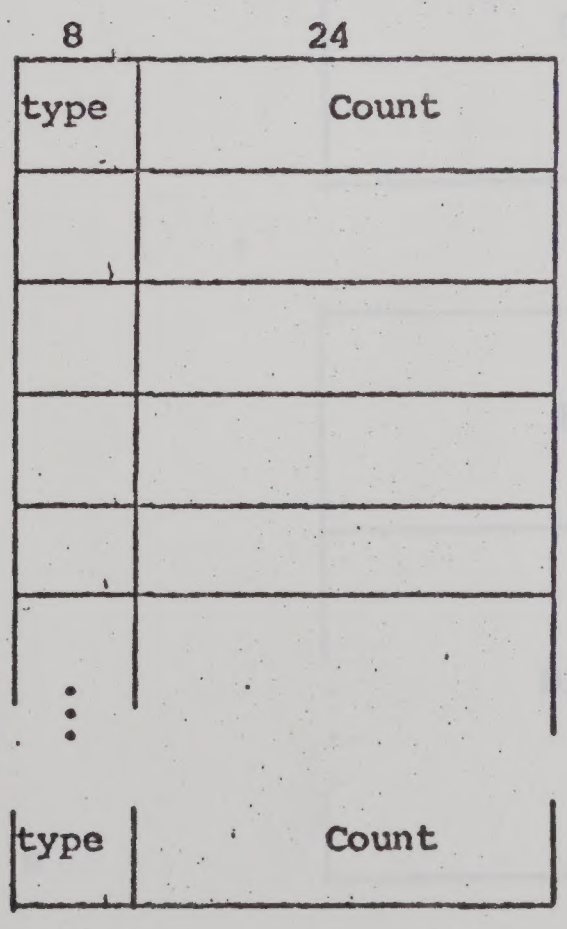
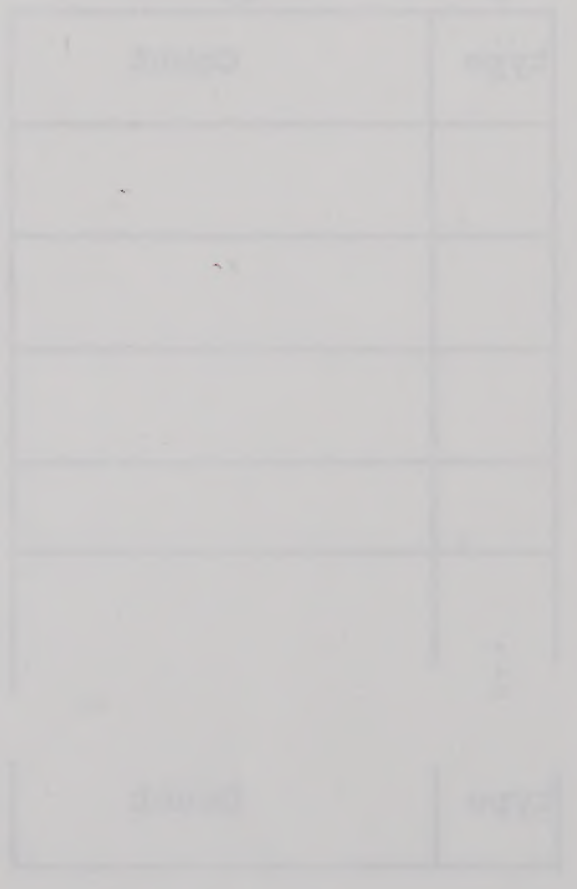
The remaining words of the message depend on Format byte settings:

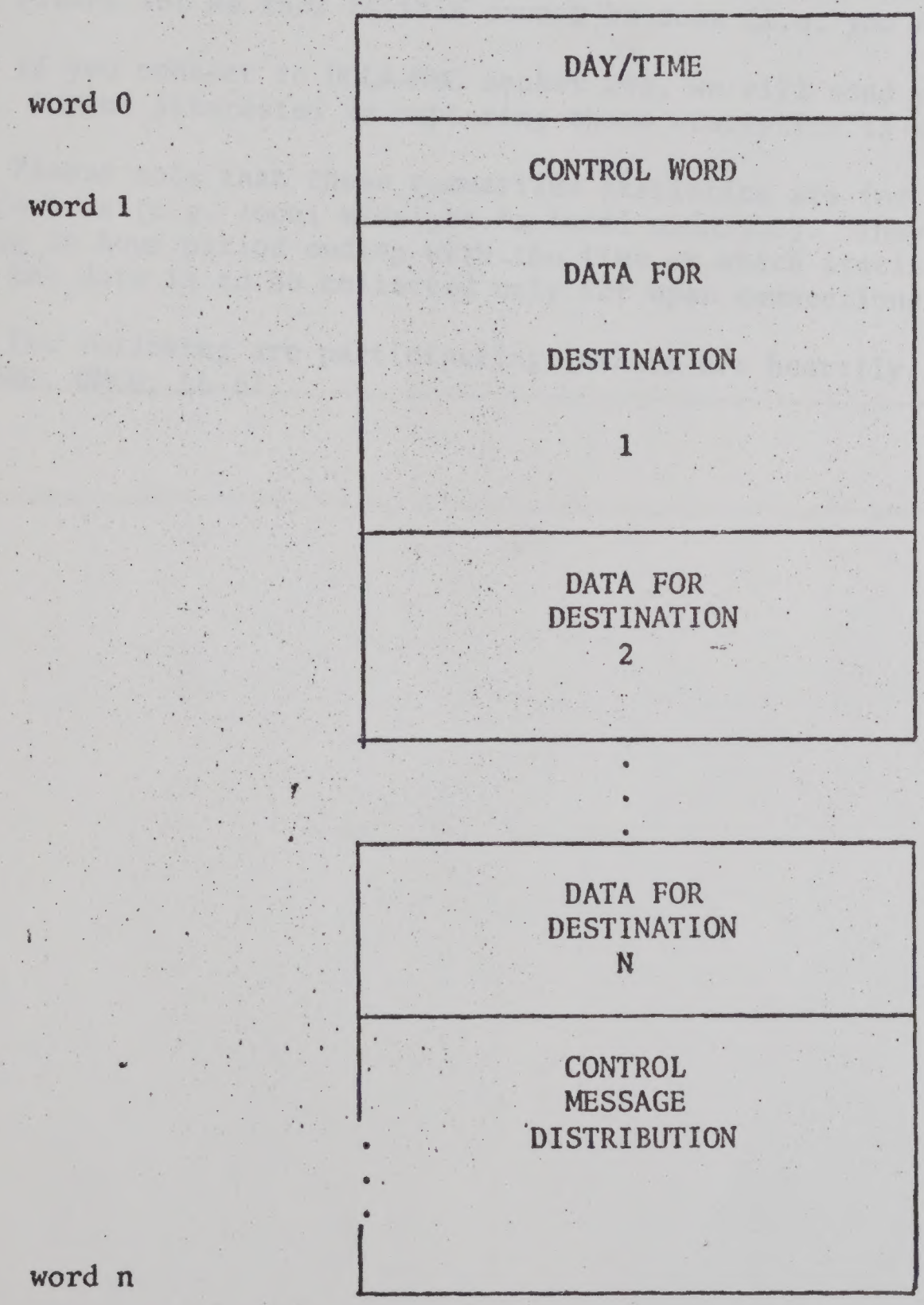




if FORMAT bit C set these are link 0 control message distributions for the sample period, cumulative overall HOSTs. If a Type is not present, its count is assumed to be 0.



Thus, the data you send will look roughly like this.



On completion of transmission of the last message, and after you receive the RFNM for this last message, close the connection.

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In the original specification, we said that the data gathering program would ICP to some well-known socket. We believe this to be an unnecessary complication and instead, we will merely open a connection on your 241 (decimal), expecting you to send data as soon as our Allocate command is received by your NCP. Please let me know if this cannot be done (i.e. you need the ICP).

If you connect to UCLA-NMC socket 241, we will send you our own 24 hour data. Anyone interested in capturing these statistics is welcome to do so.

Please note that these summarized statistics are for standard local 24 hour periods (e.g. local midnight to local midnight). They are not for a sliding 24 hour period ending with the time at which statistics were requested. Also, the data is to be collected only for open connections on links 0, 2-71.

The following are participating (others are heartily invited):
UCLA-NMC, DMCG, LL-67.